# Blogging in teacher professional development: Its role in building computer-assisted language teaching skills

# Puvaneswary Murugaiah Universiti Sains Malaysia, Malaysia

# Hazita Azman, Azizah Ya'acob and Siew Ming Thang Universiti Kebangsaan Malaysia, Malaysia

## **ABSTRACT**

Teaching in today's classroom is technology-driven. For language teachers, computer-assisted language learning (CALL) is exciting yet challenging as they are required to possess appropriate skills and knowledge to teach in such an environment. Both technical skills and pedagogical knowledge are crucial for teaching and learning in a technologically-enhanced classroom (Hubbard & Levy 2006). Consequently, teachers must be provided opportunities to learn and develop these skills. Online interactive platforms like blogs and Facebook can expose teachers to this. Through interaction with peers, teachers are not only made aware of the skills but also learn how to integrate the skills in their instruction. This paper attempts to demonstrate that teacher involvement in a community of practice can assist them in this endeavour. It is based on a study involving Malaysian Smart School English language teachers who shared their knowledge and experiences with other members in their community of practice through blogging. The findings suggest that teacher collaboration via blogs can expose teachers to skills that are critical for computer-assisted teaching and help them to enhance existing competences.

**Keywords**: computer-assisted language learning (CALL); blogging; community of practice; teacher collaboration; technology-based language teaching skills

#### INTRODUCTION

Teachers play a central role in ensuring the successful implementation of educational policies in schools. In fact, they play multiple roles. They work in multi-faceted and complex environments where they are constantly negotiating classroom decisions on content and pedagogical issues and balancing many other duties. Even more challenging is the demand for them to be well-equipped with the latest technological and pedagogical skills that would inform their teaching practice. They must meet the numerous expectations of students, administrators and community. It is expected of them to be well-versed in computer-mediated instruction, especially the use of Web technologies in their practice. Online learning featuring email, discussion boards, blogs and wikis are becoming increasingly common in today's technologically-enabled schools. Teachers are required to possess appropriate skills and pedagogical knowledge to teach in such an environment. This article aims to shed light on how Smart School English language teachers are exposed to and can build on technical skills and pedagogical knowledge required to teach in technology-enriched schools through blog interactions in an English community of practice.

## **SMART SCHOOL REFORM**

Information technology has been viewed by many developing nations including Malaysia, as a tool capable to modernise and transform them into developed nations (Warschauer 2001). To encourage the development of information and communications technology (ICT) in Malaysian education, the smart school initiative was launched. It is anticipated that smart schools can capitalise on leading current ICT technology (Frost & Sullivan 2006) and transform Malaysian schools into technology enablers (Ministry of Education 1997a). There are five main goals for the establishment of smart schools: (1) to provide all-round development of the individual, (2) to provide opportunities to enhance individual strengths and abilities, (3) to produce a thinking and technology-literate workforce, (4) to democratise education, and (5) to increase participation of stakeholders such as teachers, principals, Ministry of Education (MoE) officers, support staff and parents (Ministry of Education 1997b: p.22).

Fundamentally, according to Baylor and Ritchie (2002), technology will not affect transformations in the classroom if teachers do not have the skills, knowledge and attitudes necessary to infuse it into the curriculum. Thus the success of smart schools depends on key players such as teachers and administrators. According to the Ministry of Education's roll-out plan, by 2010, 100,000 teachers nationwide must be trained professionally in the knowledge, skills and perceptions necessary to fulfill their roles. However, despite the training provided to equip teachers with the relevant skills, it has been found that the smart school initiative is still facing numerous challenges that hinder its progress. Several local studies have revealed that teachers in these schools are not prepared for the implementation of this reform mainly due to the lack of ICT integration in their teaching. Nawawi et al (2005) investigating utilisation of ICT in teaching among the mathematics teachers in smart schools found that knowledge about, and skills in, using computers are closely related to teachers' participation in the decision-making process to integrate computers in their teaching. They emphasised that:

without the proper knowledge and skills to use the technology, mathematics teachers may be reluctant to do so or perhaps discontinue using it (ibid, p.94).

This condition should be of concern as insufficient training or lack of ICT skills is the most common reason for non-adoption or discontinuance of an innovation according to Ellsworth (2000). Meanwhile Razak and Embi (2004) in their study on an IT competency framework for English language teachers, asserted the need for a regular review of teachers' competencies to ensure there are effective teachers in computer-based classrooms in the smart schools. Samuel and Bakar (2006) concur with them. They reiterated the need for a computer skills training on an ongoing basis to keep teachers up to date with the advancements in educational technology. Thus, not only is it imperative to ensure that the teachers possess technological knowledge and skills, it is more important to put in place a continual skills development programme to ensure that these skills are further upgraded and enhanced.

Taking cognisance of these concerns, a continuing professional development programme known as the eCPDeIT project was developed to provide smart school teachers with the means to continually increase their technological knowledge and skills and integrate them in their instructional practices, through a supportive and collaborative learning environment created by a community of practice (CoP). This paper goes on to describe how an online continuing professional development programme can assist English language teachers in learning about and building on skills essential for computer-assisted instruction.

## THE eCPDeIT VISION 2020 PROJECT

The Online Continuing Professional Development of Teachers (eCPDeIT) project is a university-school partnership to build an online system for Continuing Professional Development (CPD) for twenty teachers from five Smart Schools. The team members were from the National University of Malaysia (UKM), University of Malaysia Sabah (UMS) and University of Nottingham, U.K.. The project aims to develop three communities of practice (CoPs) among English, Mathematics and Science teachers to help them in improving their practice and ICT skills necessary for a technologically-enriched teaching environment. A CoP is generally a group of practitioners who gather to share ideas and solve problems with the aim of improving their practice. As they collaborate with one another and discuss the issues at hand, they learn as well as develop relationships with other members (Wenger 1998). With the development of CoPs, it is anticipated that smart school teachers involved in this project can share experiences, knowledge and skills that would assist them in their practice. They can improve the use of ICT in their teaching practice as well as get the continuous support they need to cope with challenges of a technology-driven educational reform (Thang et al. 2010a; 2010b).

As the project aimed to develop communities of practice, teachers were divided into three cohorts: English, Mathematics and Science. Each community is assigned three research team members who also act as moderators to monitor the CoPs' progress. They facilitate teacher interactions, provide feedback when necessary and help to overcome problems faced by the teachers. Teacher collaboration was made possible through two online tools: blogs and the virtual interactive platform (ViP). A blogsite was created for the project and each community was assigned a specific blogsite within the eCPDeIT site. In other words, there were three blogsites within the eCPDeIT blogsite. The ViP, on the other hand, is an online platform that allows participants to discuss issues online based on videos regarding practice that are uploaded into it. This paper highlights only one of the CoPs, namely the English cohort, whose online engagement through blogging will be analysed to detect current competences and uptake of newly shared learning through the professional social interactions constructed online.

#### **RELEVANT LITERATURE**

It is obvious from the available body of work on teacher learning that the concept of teacher learning has changed with time. McLaughlin and Oberman (1996) rightly pointed out that a teacher who learns gains an understanding of new concepts of content and pedagogy as well as the new role of educator that he plays. Shulman (1986) proposed the concept of 'pedagogical content knowledge' (PCK). In this framework, teachers' subject knowledge is transformed by practice, so that the content area of their knowledge is developed into 'pedagogical knowledge' (BECTA 2009). This entails understanding and how ideas and content are adjusted for learning and become meaningful to learners. Today, teachers are inundated with varied demands due to globalisation and technological advancements. Knowledge of ICT is paramount. Mishra and Koehler (2006) included ICT in their framework of teacher knowledge. They created the term technological pedagogical content knowledge (TPCK). According to them, knowledge of subject content, pedagogy and the role of technology are inter-related. Thus, teacher learning is a holistic process by which teachers continually integrate the development of subject knowledge, application of technologies and understanding of effective pedagogy (BECTA 2009).

One key challenge teachers face currently is the use of technology. The current proliferation of technological tools offers the possibility of enhancing teaching and learning experience for both teachers and learners. Teaching with such tools is exciting yet challenging. Language teaching is no exception. Computer-assisted language learning (CALL) provides teachers the opportunity to

incorporate PowerPoint presentations, photos and slide shows, audio and video resources in their teaching, making their lessons attractive. Hyperlinks and social networking sites give language teachers much-needed support for creating effective computer-mediated teaching activities. Teachers can design tasks appropriate for a computer-based teaching environment. Furthermore, these resources, if exploited appropriately, can ease teaching as learners are provided with additional aids which can be integrated into their studies (Hampel 2009). The multi-potentiality of these tools can only be manifested if teachers possess the skills and integrate them in their teaching. The onus, therefore, is on teachers to create a meaningful context for their use within the language learning classroom (Murray & Hourigan 2008). They need to learn to improve their knowledge and professional growth. With learners having more opportunities to utilise web-based learning, it is mandatory (Carlson 2003).

Blogs present a platform for teachers to improve themselves through interaction with others. They are unique in that they serve as a platform for scaffolding, student-centered learning, the incorporation of multiple perspectives, and the development of communities (Yang 2009). According to Barlett-Bragg (cited in Muwanga-Zake et al., 2010), they provide an opportunity to engage in and scaffold knowledge construction. In fact, blogging has the potential to boost constructivist cognition and metacognition (higher order thinking skills). Members, through selfreflection, are able to explore their knowledge and exchange information, enhancing both individual knowledge construction and group knowledge sharing (Liaw et al 2008). Farmer (2007) pointed out that although as a group users connect with one another by expressing and sharing their views and feelings in the blog space, they exercise their personal assertion and empowerment in doing so. Furthermore, knowledge is gained from multiple perspectives because participants who may be of diverse nationalities, backgrounds and character can share opinions and express ideas by using a language they all understand. This enriches the collaborative learning process. Moreover, blogs promote community building as they are constructed by people who share mutual interests to collaboratively discuss common issues. In fact, a blog denotes a small learning community (Efimova & Fiedler 2003). A sense of community is established when participants reflect as a group and comment on each other's viewpoints to improve practice.

## **COMMUNITY OF PRACTICE FRAMEWORK**

A community of practice (CoP) is a model that is based on the social constructivism perspective, which involves learning by sharing practice. Members interact with one another and share experiences that relate to an area of knowledge or activity that is of interest to them (Carroll 2008). They solve problems, share ideas, build strategies and develop relationships with other members (Snyder & Briggs 2003). The CoP concept is increasingly popular in the professional development of teachers. It has been found that it provides support for teachers and helps them in their professional growth. With the advent of Web technologies, online communities are booming. Barab et al (2004) described an online community as:

a persistent, sustained [socio-technical] network of individuals who share and develop an overlapping knowledge base, set of beliefs, values, history and experiences focused on a common practice and/or mutual enterprise (p.23).

Many computer applications that promote interactive learning, especially asynchronous computer-mediated communication such as email and electronic bulletin boards, are tools used for online collaboration. Currently blogs have gained popularity as an interactive tool in online communities of practice. A number of studies have affirmed the ability of blogs to support both reflection and collaboration, processes that are vital in a community (Swan & Shea 2005; Hawkes 2000; Lord & Lomicka 2004; Ahern et al 2006).

#### FRAMEWORK OF STUDY

As mentioned earlier, this study is based on the eCPDelT project which uses the CoP approach. Teachers share ideas and experiences not only to improve practice in general but also to enhance their ICT knowledge and skills. What are the skills that are crucial for technology-based language teaching? Hampel and Stickler (2005) identified seven skills, presented in the form of a pyramid that online language teachers need (Figure 1).

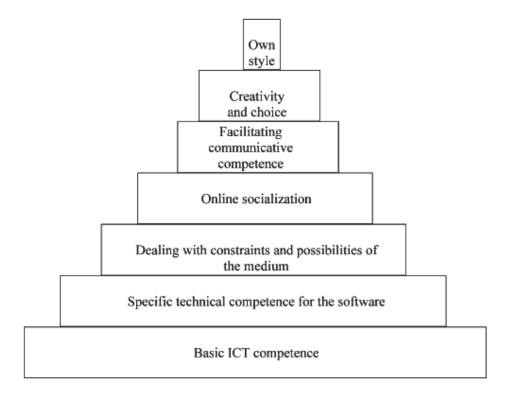


Figure 1: Skills pyramid (Hampel & Stickler 2005)

Level 1, the lowest level, represents the most general skills while Level 7, the highest, offers individual styles. One needs to master the lower levels before proceeding to the next. The most basic skill involving being competent in common computer applications like word processing and the Internet is represented in Level 1. In Level 2, one must possess skills to use specific software. There are many forms of educational software that are available such as the Blackboard and Activeboard. Teachers must know how to apply any software before using it. In Level 3, online teachers must be able to deal with constraints and possibilities of the medium they use. They have to make the best of a programme by adapting their teaching materials and content to it. This includes the ability to deal with learners' negative emotions (for example, disappointment and frustration) as well as positive emotional states (for example, high expectations of the possibilities of the new media) when engaging with technology.

At Level 4, teachers are required to possess skills to create a sense of community in the online classroom. It involves online protocols or nettiquette that online users must adhere to. Facilitating

communicative competence is the next level in the pyramid. Here, teachers must be able to encourage learners to communicate and socialise as a group. This can be achieved through task design and teacher-intervention. Level 5 represents skills associated with creativity and choice. Online teachers must be able to select materials that are appropriate for their learners from the numerous resources available online. They can be creative by adapting materials or tasks to their classroom context or design their own online activities. At Level 7, the highest level or the apex of the pyramid, the teacher would have created her own teaching style by using the resources creatively and building a close rapport with her students.

## RESEARCH METHODOLOGY

The e-CPDeIT project comprised twenty teachers from five smart schools located in the Klang Valley and the Federal Territory of Kuala Lumpur. The English language community of practice in the e-CPDeIT project consisted of five female teachers. Their teaching experience ranged from 5 to 18 years, four of whom have more than 10 years of experience. Since these teachers do not know each other, two meetings were organised prior to the blogging activity, where they were introduced to other team members and briefed on their roles in the tasks prepared for them, especially the blogging activity. It is imperative to note that even though the size of an online CoP is generally large (more than a hundred), it is normal to have small-sized CoPs (5-8 members). A natural, voluntary and purely virtual community can be large-scaled. Nonetheless, one which is designed, pre-planned with pre-determined aims can be small (Lewis & Allen 2005). Such a community, such as the one developed in the eCPDeIT project, features members who volunteered or were selected. They were invited to scheduled face-to-face meetings to form relationships and get to know each other well. After this initiation into the group, the participants are expected to continue to share and construct a collaborative community online via the blogs.

Blogging was one of the avenues for teacher collaboration in the eCPDeIT project. In this activity, participants were required to post blog entries on two tasks regarding their teaching practice; that is, reflecting on a lesson they deemed good and another which they considered poor. After posting their entries, they were required to comment on postings by other participants in the discussion forum. There was no limit as to the frequency and number of postings although they were encouraged to post as often and as many as they could. Three research team members were the moderators for the CoP. They provided technical assistance and shared their views with the teachers in the blog. It created a rapport between the research team and the teachers. It was mutually agreed by both the teachers and moderators that the blog entries would be posted within a month after the task was given. Initially, the response from the teachers was poor. However, with the timely intervention of the moderators, teacher participation in the blog activity improved. The moderators provided support, particularly technical and emotional support. Some teachers could not access the blogsite while a few had problems posting their entries. As far as emotional support is concerned, the teachers were rather apprehensive at the beginning to post their views. The moderators had to encourage and coax them to be active participants in the activity. After the initial hiccup, the teachers began to post their entries and comment on other postings. The blogging activity was conducted over a five-month duration.

A textual analysis of the blog postings was conducted to reveal the teachers' current CALL skills levels as described in the skills pyramid by Hampel and Stickler (2005). The interactions were also analysed to explore the extent to which the teachers' sharing of experiences through the blogging activity exposed teachers to the technical and pedagogical skills necessary for teaching in a technologically-driven teaching environment, as demonstrated in the skills pyramid (Hampel & Stickler 2005).

#### **LIMITATIONS**

Over the period of five months, only six blog entries and twenty four comments by the five participants were recorded. The small number of entries is not unusual. In a study to examine the pedagogical use of ICT by university staff, Muwanga-Zake et al (2010) found that out of ten Australian universities they sampled, only three blogged. They implied that although there is evidence from research work on the success and potential of blogging in the education field, it does not mean that educationists, in their case the university staff, would take to it. Thang et al (2009; 2010a; 2010b) identified and discussed some of the problems that led to the low participation rate in the eCPDeIT project. They include problems related to ICT such as (1) unfamiliarity with the ICT resources provided, (2) institutional and administrative barriers such as lack of cooperation from head teachers (3) institutional and organisational barriers such as lack of access to online facilities and lack of time to be committed due to heavy workload, and (4) negative perception towards ICT use and fear of being embarrassed by their colleagues and students. Sociocultural and psychological problems were also identified. There was a possibility that this was because CoP was a novel concept and hence teachers had difficulty accepting and adapting to it. Other reasons include unfamiliarity to each other and fear of losing face and embarrassing others with their comments.

Due to the small number of blog postings, this paper only provides a 'flavour' of the potentiality of blogs in enhancing CALL skills. Based on the findings, a conclusive deduction cannot be made. However, there were certainly indications that through blog discussions, teachers could learn and build on their CALL skills.

#### **FINDINGS**

Although the small number of blog entries is an issue, a general conclusion can still be drawn. The findings revealed the teachers were exposed not only to new skills, but they also enhanced their existing skills through the blogging activity. Furthermore, they could get peer support by sharing and collaborating with other members.

# **Exposure to Skills**

Findings from the text analysis demonstrate that the teachers are exposed to all seven skills required for CALL instruction.

## Level 1: Basic ICT Competence

CALL instructors should possess basic IT skills which include emailing and browsing the Internet for information. In the study, some teachers stated in the blog that they use basic IT skills in planning an activity.

N: ...browse the internet to look for the image of a type of house that they would to live in...copy and paste the image into a word document...send in their entries as attachment via e-mail to the teacher.

C: ...we (teacher and students) looked at information on a famous person in the Internet...

# Level 2: Specific Technical Competence for the Software

Skills at this level are associated with knowledge of specific software. The English teachers posted in the blog that they planned for lessons that require students to use a software application that they would have demonstrated on how to use. At the same time they also indicated that they possessed the knowledge and skill on how to use specific software such as the Publisher and Photoshop. For example:

SH: In this lesson, students were required to produce an itinerary of a place that they would like to visit... use the Publisher programme to produce an itinerary.

S: The final few photos were superimposed. I did some editing with adobe photoshop to make them look slightly older, darker, with long hair etc.

## Level 3: Dealing with Constraints and Possibilities of the Medium

At this level teachers demonstrate the ability to deal with constraints and possibilities with the medium. One teacher shared her experience of dealing with the possibilities of educational tools that brought about positive emotions among her students:

S: The topic was about people and it was a lesson (to enhance writing) on describing people appearances. Using power point, I started off with showing them their very own snapshots that I had taken earlier during my classes. I got them to describe their own appearances. They responded well to the pictures shown as it were their very own. They had a good time laughing and at the same time describing at those candid shots I took. The describing went on and on for quite some time as they were describing from head to toe. Without realising, they have successfully described using adjectives...The final few photos were superimposed. I did some editing with adobe photoshop to make them look slightly older, darker, with long hair etc. They were simply in 'stitches'!

Another teacher shared the constraints of introducing a new programme to her students:

SH: In one lesson, students were required to produce an itinerary of a place that they would like to visit... To make it more interesting, students were required to use the Publisher programme to produce an itinerary. As students were not familiar with Publisher programme, during the lesson, students asked many questions regarding the programme. Besides, there were many technical difficulties that I had to solve.

#### Level 4: Online Socialisation

This level is on online socialisation. At this level, the ability to create an online environment where interaction can be fostered is demonstrated. This level is closely linked to the next in that communicative competence must be nurtured for online socialisation to take place, as demonstrated by teacher C below.

## Level 5: Facilitating Communicative Competence

This is an important skill to develop and practice in the teaching and learning contexts. Possessing knowledge and skills of online socialisation tools such as blogs, chatting, Facebook among others is necessary for a smart school teacher. One teacher created an activity that promoted interaction among her students by showing them how to create blogs for their mini project.

C: I got the students to create blogs based on their research on their favourite person for their project. I encouraged them to try something new and different with their own blogs such as adding in video clip, being creative with the fonts and colours and so forth.

Teacher C had emphasised on netiquette of blogging to her students prior to carrying out the activity.

# Level 6: Creativity and Choice

At this level CALL instructors must demonstrate that they possess creative skills when choosing to integrate IT in their teaching. This includes the ability to identify appropriate and relevant tools and applications for learning activities as well as to match these with the different types of students' learning preferences and needs. The teacher cited below for example, designed her IT infused lessons to accommodate for the linguistically and IT challenged students as well as for the more capable students. She had selected blogging as the medium to be used for the journal writing project. Mindful of her weaker students she planned to motivate and introduce them to the task designed by phases. The blogs that the students eventually produced, as listed, demonstrated her successful strategy.

C: So with weaker students the challenge is to motivate them and to find areas of interest for them to "find themselves". With my students I am starting some unofficial work this year. First is to do journaling via blogging, ... then another activity ... this is still in the beginning stage, I am doing a blog for internet homework.

... Here are the urls of my students' tributes. Just sharing. I haven't graded them yet. But I am impressed with some of the blogs.

http://tunkuabdulrahman-insz.blogspot.com/

http://3bakti09.blogspot.com/

http://ghandihateswar.blogspot.com/

http://oprahwinfrev54.blogspot.com/

http://yooitsobamanator.blogspot.com/

## Level 7: Own Style

At the most expert level, the CALL instructor should demonstrate the ability to create her own style in using and integrating IT for her teaching and learning purposes and goals.

Among the CoP members, teachers C and S showed that they possessed this skill. Teacher C, for instance, had asked students to use blogs and hyperlinks to search and access knowledge on multiple subjects and had related the contents discovered online with the text to be read. This approach to the lesson clearly demonstrated her creative way of using web technology to provide students with multiple perspectives and input as content for discussion, comparison and comprehension. By using the tools and applications, she had developed her own style in using IT in her teaching the language.

Teacher S also came up with interesting lessons that were creative, such as the one on describing appearances (the example shown in Level 3). She also suggested a creative lesson to one of the community members who admitted her lack of competence in incorporating IT in the activity she had planned:

ST: ...giving instructions, to be exact, writing instructions for a recipe. Students were also required to use sequence connectors in the instructions...I haven't tried this using the IT yet, don't know how to.

Teacher S provided an idea which could help elevate her IT competence:

S: ...to teach sequence, I have always wanted to teach how to put on make up - for sequence connectors (a complete make over class)...you could use a model (grab one the kids):) make her look beautiful...show them the very first step to make up - let all your artistic talent out!!! Emphasize on sequence connectors when you model the steps..show them the 'before' and 'after' look...if you insist on bringing the IT elements..you could video cam the lesson...take candid shots..use the images on power point and get them to write the 'process and procedure' to apply good make up / to look gorgeous.

This section reveals that teachers, through blogging, are exposed to the various skills that are required for them to teach in a technology-based classroom. They also learn how to integrate them in their teaching.

# **Enhancement of Existing Skills**

The blog interactions of the participants as reported above, reveal that the virtual space provided opportunities for them to learn about competences expected of them as teachers in an ICT-enabled teaching environment. Besides exposing teachers to the skills, the blogging activity also provided them a means to build on these skills. The example of the interaction between teachers SH and S above depicts this. Their interaction enhances teacher SH's existing competences as well as her self confidence in the new ways of integrating technology in educational contexts.

In another discussion, teacher N described a lesson that only required basic IT skills (using a word document and emailing). Teacher S gave her ideas that would not only make the lesson more interesting but also enhance Teacher N's competence level. Her (Teacher S) suggestions provided teacher N with alternative ways of using the Internet and its tools to approach the topic:

- N: ...look for the image of a type of house that they would like to live in. They were told to copy and paste the image into a word document...send in their entries as attachment via email to the teacher.
- S: ...showing the students pictures of various types of human shelters ranging from the old, ancient, poor one to modern, developed and owned by those filthy rich people, celebrity homes etc...then you can get them to design their own home. This way, you are actually gearing them to learn the poem.

A similar example is demonstrated below. On the issue of curbing the use of the native language (L1) in a second language (L2) lessons, one of the moderators voiced her opinion.

- H: ...give them more 'contrived' or 'orchestrated' opportunities to use English...like chatting online with non-Malaysians or to get them to 'police' each other--make it a competition perhaps. Remember Doogie Howzer?
- C: I remember Doogie Howzer!!!! Now that you mention it, yeah a good idea indeed.

S: ...that sounds pretty interesting...I might try it...get them to 'police' each other...okay I'll think of something to go with it, thanks!

It is apparent from these examples that the interactive space provided by blogs presents opportunities for teachers to learn about and build on skills required for online teaching.

# Sharing and Collaboration through Blogging

Apart from sharing constructive ideas and successful IT infused lessons, the blog interactions also provided the participants with a common platform to voice out their emotional frustrations and the tensions they experience when using IT. The rapport created online as a community has given them the confidence to confide these tumultuous emotions experienced which they feel can impede their continuous learning and enhancement of CALL skills as presented in the Skills Pyramid.

In one example, a teacher assumed that her students knew how to use emails. Her lesson was affected when she found out that not all of them knew how to. This revelation may hinder the teacher's motivation to incorporate more advanced tools in her lessons, especially in encouraging her students to use such tools in a CALL activity:

N: ... I had actually overestimated the students' ability in using e-mails...some students did not have an e-mail account and neither knew how to create one. Some had an account but didn't know how to send attachments via e-mails....those who knew were only willing to help others after they had finished their work...So, I had to stop the students halfway and teach it.

Time constraint is another factor that a teacher highlighted. It can become a main influencing reason for not adopting IT into her lessons. In most cases teachers are hard pressed for time to prepare interesting and creative lessons. Hence, time and not competence in IT skills could become the hindrance in smart school teaching and learning contexts as cited by the teachers below:

S: We want to do so much stuff...we even want to bring 'the world' closer to the kids...its just that we are so bound with so many things to do in school...could not put ample time for planning our lessons.

One teacher, although keen to use a new programme, found that it was time consuming:

SH: ...like to teach a group of good students I have to spend some time editing photo shots, still new to me. I learned that I had to be knowledgeable and confident in using Publisher in order to use the programme to teach.

The discussion of common issues among the participants revealed their shared concerns; that is, the challenges in technology-enabled schools. The blogging activity as a medium for the CoP had created a sense of belonging among the participants as they could relate to each other. A sense of belonging to the community is crucial for the participants to feel free to voice out their opinions. Only with a strong community feeling will there be more active participation from members. Ongoing interaction and collaboration in learning through the blogs would make the CoP members feel connected to one another. These findings also imply that support for each other will encourage teachers to be more confident in the decision-making process to integrate IT applications in teaching and learning contexts.

#### CONCLUSION

Two conclusions can be drawn from this study. On the matter of the current CALL related competencies of the smart school teachers, the investigation revealed that the blogging activity exposed teachers to the skills proposed by Hampel and Stickler (2005) and helped them in enhancing their existing competences. Through online collaboration, these skills were shared with others. Furthermore, it revealed other pressing issues such as unfamiliarity of tools, technologyrelated problems and time constrains that can hamper skill enhancement. These challenges must be overcome to ensure skill enhancement necessary for CALL instruction is promoted. Secondly, the findings of the study demonstrated that blogging, as an interactive tool was found to be effective when used as a medium of eliciting interaction and information in the CoP platform (eCPDelt). The blogs also demonstrated how new ways of doing IT in teaching was shared and learned by the CoP participants. The interactions that developed provided the English language teachers the opportunity to share, enquire, enhance and learn skills necessary for CALL instruction as an impetus towards their own motivation to continue to use IT in their own teaching contexts. It can be concluded that despite the challenges faced during the blogging activity, participants did learn and enhance CALL skills. Therefore, improving and consolidating on such online activities would mean helping teachers to equip themselves with the relevant ICT skills useful in their daily practice. Further research is necessary not only to substantiate these claims, but also to give more insights on the potentiality of online discussions in enhancing pedagogical, content and technological knowledge.

#### **ACKNOWLEDGEMENT**

This article is based on a research project (Code number: UKM-GUP-TMK-08-03-310) funded by a research grant provided by the National University of Malaysia.

#### REFERENCES

- Ahern, T.C., Thomas, J.A., Tallent-Runnels, M.K., Lan, W.Y., Cooper, S., Lu, X. & Cyrus, J. 2006, "The effect of social grounding on collaboration in a computer-mediated small group discussion", *Internet and Higher Education*, vol. 9, no. 1, pp. 37-46.
- Atkin, M. & Black, P. 2003, *Inside Science Education Reform: A History of Curricular and Policy Change*, Teachers College Press, New York.
- Barab, S.A., MaKinster, J.G. & Scheckler, R. 2004, "Designing system dualities: Characterizing an online professional development community", in S.A. Barab, R. Kling & J. Gray, (eds.), *Designing for virtual communities in the service of learning*, pp. 53-90, Cambridge University Press, Cambridge, MA.
- Baylor, A. & Ritchie, D. 2002, "What factors facilitate teacher skill, teacher morale, and perceived student learning in technology-using classroom?", *Computer & Education*, vol. 39, no. 1, pp. 395-414.
- BECTA 2009, Continuing Professional Development in ICT for teachers: A literature review, Retrieved April 16, 2010 from http://www.becta.org.uk.

- Carlson, S. 2003, "Weblogs come to the classroom", The Chronicle of Higher Education, vol. 50, no.14, pp. 33-34.
- Carroll, M. 2008, "Primary science and 'communities of collaborative enquiry", Education Today, vol. 58, no.1, pp. 2-19.
- Efimova, L. & Fiedler, S. 2003, "Learning webs: Learning in weblog networks", In P. Kommers, P. Isaias & M.B. Nunes, (eds.), Proceedings of the IADIS International Conference Web Based Communities 2004, pp. 490-494), IADIS Press, Lisbon.
- Ellsworth, J.B. 2000, A Survey of Educational Change Models. Syracuse University, Syracuse, NY.
- Farmer, B., Yue, A. & Brooks, C. 2007, "Using blogging for higher order learning in large-cohort university teaching: A case study", Proceedings ASCILITE, Singapore 2007, pp. 262-270, Retrieved September 20, 2010 from http://www.ascilite.org.au/conferences/singapore07/procs/farmer.pdf.
- Frost & Sullivan, G. 2006, Impact Assessment Study of the Smart School Integrated Solution and Other ICT Initiatives, Commissioned by MSC Malaysia and the Ministry of Education, Malaysia.
- Hampel, R. 2009, "Training teachers for the multimedia age: Developing teacher expertise to enhance online learner interaction and collaboration", Innovation in Language Learning and Teaching, vol. 3, no. 1, pp. 35-50.
- Hampel, R. & Stickler, U. 2005, "New skills for new classrooms: Training tutors to teach languages online", Computer Assisted Language Learning, vol. 18, no. 4, pp. 311-326.
- Hawkes, M. 2000. "Structuring computer-mediated communication for collaborative teacher development", Journal of Research and Development in Education, vol. 33, no. 4, pp. 268-284.
- Hubbard, P. & Levy, M. (eds.), 2006, "Introduction", In Teacher Education in CALL, John Benjamins, Amsterdam; Philadelphia, PA, pp. ix-xi.
- Lewis, D. & Allen, B. 2005, Virtual learning community: A guide for practitioners, Open University Press, Berkshire, England.
- Liaw, S.S., Chen, G.D. & Huang, H.M. 2008, "Users' attitudes toward Web-based collaborative learning systems for knowledge management", Computers and Education, vol. 50, no. 3, pp. 950-961.
- Lord, G. & Lomicka, L.L. 2004, "Developing collaborative cyber communities to prepare tomorrow's teachers", Foreign Language Annals, vol. 37, no. 3, pp. 401-417.
- McLaughlin, M.W. & Oberman, I. (eds.), 1996, Teacher learning: New policies, new practices. Teachers College Press, New York.
- Ministry of Education. 1997a, The Malaysian Smart School Implementation Plan, Kuala

- Lumpur, Ministry of Education, Malaysia.
- Ministry of Education 1997b, *The Malaysian Smart School, an MSC flagship application: A Conceptual Blueprint,* Kuala Lumpur: Ministry of Education, p. 22.
- Mishra, P. & Koehler, M.J. 2006, "Technological pedagogical content knowledge: A framework for teacher knowledge", *Teachers College Record*, vol. 108, no. 6, pp. 1017-1054.
- Murray, L. & Hourigan, T. 2008, "Blogs for specific purposes: Expressivist or socio-cognitivist approach?" *European Association for Computer Assisted Language Learning (ReCALL)*, vol. 20, no. 1, pp. 82-97.
- Muwanga-Zake, J.W.F., Parkes, M. & Gregory, S. 2010, "Blogging at university as a case study in instructional design: Challenges and suggestions towards professional development", *International Journal of Education and Development using Information and Communication Technology (IJEDICT)*, vol. 6, no 1, pp. 1-16.
- Nawawi, M., Ayub, M.F., W.A,Z., Yunus, A.S. & Tarmizi, R. 2005, "Teachers' perceptions on the conditions facilitating the use of computers in teaching mathematics", *Malaysian Online Journal of Instructional Technology (MOJIT)*, vol. 2, no. 3, pp. 88-98, available at <a href="http://pppjj.usm.my/mojit/articles/pdf/Dec05/11%20-%20MATHEMATICS TEACHERS PERCEPTIONS-f.pdf">http://pppjj.usm.my/mojit/articles/pdf/Dec05/11%20-%20MATHEMATICS TEACHERS PERCEPTIONS-f.pdf</a>
- Razak, N.A. & Embi, M.A. 2004, "A Framework of IT Competency for English Language Teachers", *Internet Journal of e-Language Learning and Teaching*, vol. 1, no. 1, available at <a href="http://www.eltrec.ukm.my/ijelt">http://www.eltrec.ukm.my/ijelt</a>.
- Samuel, R. & Bakar, Z. 2006, "The utilization and integration of ICT Tools in promoting English language teaching and learning: reflections from English option teachers in Kuala Langat district, Malaysia", *International Journal of Education and Development using ICT*,vol. 2, no. 2, available at <a href="http://ijedict.dec.uwi.edu/viewarticle.php?id=161">http://ijedict.dec.uwi.edu/viewarticle.php?id=161</a>.
- Shulman, L. 1986, "Those who understand: knowledge growth in teaching", *Educational Researcher*, vol. 15, no. 2, pp. 4-14.
- Snyder, W.M. & Briggs, X.S. 2003, *Communities of practice: A new tool for government managers*, Retrieved October 12, 2009 from www.businessofgovernment.org.
- Swan, K. & Shea, P. 2005, "The development of virtual learning communities", in S.R. Hiltz & R. Goldman, (eds.), *Learning together online: Research on asynchronous learning networks*, pp. 239-260, Lawrence Erlbaum Associates: New Jersey.
- Thang, S.M., Hall, C., Azman, H. & Joyes, G. 2010a, "Supporting teachers' continuing professional development in and through ICT: A model for change", *International Journal of Educational Development in ICT*, vol. 6, no. 2, available at <a href="http://ijedict.dec.uwi.edu/">http://ijedict.dec.uwi.edu/</a>.
- Thang, S.M., Murugaiah, P., Lee, K.W., Hazita Azman, Tan, L.Y. & Lee, Y.S. 2010b, "Grappling with technology: A case of supporting Malaysian Smart School teachers' professional development", *Australasian Journal of Educational Technology*, vol. 26, no. 3, pp. 400-416, available at http://www.ascilite.org.au/ajet/ajet26/thang.html.

- Thang, S.M., Azman, H., Nambiar, R., Lee, K.W., Yuen, C.K. & Bidmeshki, L. 2009, Teachers' views of their involvement in an online community of practice project. CALL-EJ Online, vol. 11, no. 1.
- Warschauer, M. 2001, Online communication, in. R. Carter & D. Nunan, (eds.), The Cambridge guide to teaching English to speakers of other languages, pp. 207-212, Cambridge University Press, Cambridge.
- Wenger, E. 1998, Communities of Practice. Cambridge University Press, Cambridge.
- Yang, S.H. 2009, "Using blogs to enhance critical reflection and community of practice", Educational Technology & Society, vol. 12, no. 2, pp. 11-21.